count of this work appears in the Bulletin de la Soc. Med. des Hopitaux de Paris, Jan., 1911.

Of greater interest was the work reported by Nicolas, Favre, Cl. Gautier and L. Charlet (Bull. et Mem. de la Soc. Med. des Hop. de Paris and the Lyon Medicale, March, 1910) who made use of fetal heredo-syphilitic liver. This liver substance, rich in treponemes, was sterilized and concentrated as a glycerin extract which they called "syphiline." This syphiline was diluted 1-3 or ½ with sterile salt solution and introduced into the skin of the subjects by the Pirquet method of scarification. The authors accepted only reactions that were truly nodular and rejected those that were merely erythematous or urticarial. Of nine non-luetic patients only one showed any reaction and this was of "very doubtful nature." Of 29 syphilitics, 13 gave strongly positive reactions, 4 feebly positive reactions and 5, doubtful reactions. The remaining 7 were negative. In 5 tertiary cases there were 5 positive results.

In passing it might be mentioned that the same authors observed at that time and again quite recently that the various skin reactions to tuberculin were positive in a certain number of syphilitics free from tuberculosis.

It would be extremely interesting and perhaps productive of good results, to experiment in this way with various substances that have been successfully used as antigen. The material could be introduced into the skin either by the intradermic injection method or by the Pirquet method of scarification, or possibly by inunction. The writer recently tried the latter means, using syphilitic liver substance in a few cases, without success. It is hardly necessary to observe that the material used ought to be sterile.

We know that a definite specific reaction occurs in tuberculosis after the introduction into the skin of properly prepared tuberculin,—then what could be more reasonable than to expect to obtain a specific reaction in lues by the injecting of prepared syphilitic material (both being diseases due to definite organisms)? The preliminary work has been done, and although the number of cases observed is small, the results reported are encouraging. Its development will be observed with deep interest.

HARRY E. ALDERSON.

RAT LEPROSY.

The presence of a disease in rats resembling leprosy in many respects, is of more than passing interest. This condition was first observed in rats by Stefansky, who published his observations in 1903 (Centralblatt f. Bakteriol., etc., Originale, vol. 33, 1903, p. 481).

As the opportunity of examining large numbers of rodents is limited ordinarily, to campaigns against bubonic plague, it is not possible to determine whether the distribution of the disease in rats is comparable to the areas in which human leprosy is known to exist.

A number of investigators, including some on this coast, have described this condition in rats. The main features which resemble those of human leprosy are glandular enlargement, deep-seated ulcerations of the skin, alopecia, subcutaneous infiltration and visceral lesions in advanced cases.

The probable causative agent, a bacillus, strongly resembles Hansen's bacillus morphologically, tinctorially and culturally.

By means of the Bordet-Gengou reaction a distinct relationship between human and rat leprosy has been demonstrated. It is probable that this relation is similar to the relation between human and bovine tuberculosis.

From McCoy's investigations (Public Health Reports, U. S. P. H. and M. H. Service, Nov. 6, 1908) it appears that a large percentage of rats found with the leprosy-like disease come from slaughter-houses and butcher shops. It is possible that further investigation will develop a parasital line of communication between the rat and human type of leprosy.

If future experimentation does not disprove the relationship, it will afford a valuable means of studying a disease whose investigation up to recently has been chiefly along clinical lines. L. S. S.

DIORADINE.

In the June number of the Zeitschrift für Tuberkulose for 1911, appears an article by Dr. S. Bernheim of Paris, Président de l'Oeuvre de la Tuberculose Humaine, and by Dr. L. Dieupart of Paris, Médecin-Chef du dispensaire antituberculeux de St.-Denis. In this paper are given the histories of seventy-five cases of tuberculosis treated with a new drug, Dioradine, which was put on the market by Dr. Szendeffy of Buda-Pesth. The results achieved are surprisingly encouraging and satisfactory. The paper itself is written in a most convincing and, with the exception of a few remarks, in such an attractively modest way that it is bound to make an impression on every one who reads it. The results which are published, and which not only included the observations of Bernheim and Dieupart, but also those of a number of other physicians who have used the drug, as, for instance, Aba of Buda-Pesth, Hervé of Lamotte-Beuvron, Kaminsky of Paris and others, impressed me so much that I cabled to Buda-Pesth for a sufficient amount of this new drug to begin treatment of thirty cases. As soon as the Dioradine was put on the market, I telegraphed to New York for more to complete the treatment of these cases. The only objection I could find to the new drug was the way in which it was put on the market and in which it was afterwards advertised to the profession.

In his paper Dr. Bernheim makes a strong point of the fact that the medicine would be free for trial to any specialist, and that the only wish expressed by Dr. Szendeffy of Buda-Pesth was that the results of the experiments should be communicated to him. Bernheim compares the way in which Dioradine was put on the market with the introduction of other drugs, as, for instance, Behring's Tulase. He repeats Szendeffy's communications, in which the author says:

"Je suis prêt à mettre à la disposition de tous ceux qui désirent essayer ce moyen de guérison toute la quantité dont ils auront besoin pour les expériences

et cela gratuitement en leur fournissant le mode d'emploi, avec la seule réserve de vouloir bien noter leurs observations. . . . Ma composition, mes chers collègues, n'est point miraculeuse, ni mystérieuse, pas plus qu'une panacée. Elle a peut-être encore besoin d'être perfectionnée. Je ne pourrai même pas promettre son efficacité dans tous les cas: elle ne pourrait régénérer une tuberculose à la troisième période, car rien ne pourra modifier les alvéoles pulmonaires détruites."

Bernheim then continues:

"Ces paroles donnent une haute idée de la probité scientifique du Docteur Szendeffy. Ni formule secrète, ni panacée! Récemment, on lançait à grand fracas un produit contre l'avarie: c'était la panacée qui allait détrôner le mercure. L'expérience est faite: ce produit prôné à grand renfort de réclame est horriblement douloureux et ne guérit pas mieux que la médication habituelle. Il y a quelques années, un grand savant, Behring, avait trouvé sa fameuse tulase qui devait vaincre la tuberculose: c'était un remède miraculeux . . . sur le papier. Mais formule secrète; mais panacée . . . elle fut peu distribuée aux expérimentateurs et certains savants français virent leurs demandes de tulase refusées. La tulase—a vécu."

Certainly a most convincing way of recommending the new drug to the medical profession, in spite of the uncalled for and especially, in regard to the remarks about Salvarsan, most unprofessional slamming of other authorities.

I used the Dioradine in thirty cases, not choosing any advanced cases, but only those in the first and second stages of tuberculosis, so as to give the drug an absolutely fair trial. In all these cases, without exception, the results have been entirely negative. The drug has not done anything which it was supposed to do. It has not increased the appetite, it has not increased the weight, it has not decreased the cough, or sputum, or fever. In the majority of cases, the patients have shown more cough and sputum, and the rest showed no change whatsoever.

I can only wonder at the fact that the results of Bernheim and his colleagues should be so excellent and mine so entirely discouraging. As for comparing the effect of Dioradine in tuberculosis with the effect of Salvarsan in lues, or rather claiming that Dioradine will be a greater blessing to humanity than Salvarsan has proved to be so far, I can only wonder what induced Bernheim to make such a remarkable statement, a statement which must reflect badly on his judgment and sense of fairness.

I feel justified in warning the profession against the use of this new so-called remedy. It is evidently one of the many new drugs which are put on the market in a clever fashion, and which are advertised in a most convincing manner, but which are absolutely negative in their results. This way of advertising a useless drug, and of trying to fool the profession, cannot be too strongly condemned.

MAX ROTHSCHILD.

MEDICAL EDUCATION.

AN INNOVATION.

We are in receipt of a communication from Dr. Flavell B. Giffany, President of University Medical College, Kansas City, announcing the reorganization of that institution on a novel basis. The college is to cease giving instruction in the subjects of the first and second year and confine its activities to the professional studies of the third and fourth years. It is further proposed to extend the time a year so that the diploma would represent a five years' course. This innovation is indorsed by the American Association of Medical Colleges and by a committee of the American Medical Association. With proper restrictions there is much to be said in favor of colleges of this order. To the young man entering on the study of medicine the university atmosphere and facilities are most desirable, but the location of many such institutions is often far from the madding crowd where clinics are not and hospitals of the cottage variety. There is no reason why the student should not at the end of two years of quiet and steady absorption in the basic studies pass on to a finishing college in a large city replete with the clinical facilities there possible. We already have in San Francisco a similar working arrangement in the division of the Stanford and University of California courses. With proper provision that the entrants to the higher school had satisfactorily complied with the state and national requirements governing the earlier course of study there is no reason why we should not welcome the appearance of properly equipped institutions of this type. Most commendable is the extension of study to five years. Our present four years' course is indefensible in theory and a failure in practice and the sooner we get in line with the rest of the world the better will it be for our profession and the public.

A SIMPLIFIED MATERIA MEDICA.

We are in receipt of a circular from the Council of Chemistry and Pharmacy of the American Medical Association, addressed to the teacher in the medical schools and the members of the State Examining boards. Quoting Dr. Arthur Dean Bevan, it says: "With the overcrowded condition of the medical curriculum it is highly important that the small amount of time which the student has to devote to the study of drug preparations should be largely spent in obtaining a *thorough* knowledge of the more important drugs rather than in the obtaining of a superficial knowledge of all drugs, the majority of which are of little or no value." To this end the Council of Chemistry and Pharmacy have drawn up a list of drugs and their preparations compiled from the following sources:

1. A joint committee of the American Medical Association and that of the United States Pharmacopia.

2. The national confederation of State Examining and Licensing boards.

3. The list of articles of materia medica used by